

REMARKS:

The claims in the application are 1-21 and Claims 22-26 added by the present amendment..

Favorable reconsideration of the application as amended is respectfully requested.

The specification has been amended in accordance with the request on page 2 of the Office Action to eliminate the objection to the drawings and specification, with Claim 6 amended as requested on page 2 of the Office Action. Independent Claim 1 has been amended to recite the claimed invention is directed to a recording device having media for creating white light spots ; support for this recitation can be found, e.g., in the first full paragraph on page 6 of the specification. Independent Claim 1, as amended, also recites the white light spots are recorded on the recording medium at the time a picture is taken; support for this recitation can be found, e.g., at page 4, lines 7-12 of the specification where it is stated the recording creates a reference signal, i.e., when the picture is taken.

Independent Claims 19 and 20 have been amended in analogous fashion to independent Claim 1, while dependent Claims 2-18 have been amended to corresponding with the revisions to Claim 1 supra. Claims 22-26 find explicit support in Figs. 1 and 2 of the present application. In this regard, it is respectfully pointed out the phrase –at the same time– found in original independent Claim 1 and inserted into independent Claims 19 and 20 herewith, does not mean recording of the white light spot and picture must be performed exactly at the same moment; rather, there need only be certain coherence between the times of recording the picture and white light spot so that, e.g., a few seconds

may elapse between both recordings.

Accordingly, the only outstanding issue is the art rejection of the claims. More particularly, Claims 1-10, 14, 15 and 17-21 have been rejected under 35 U.S.C. §102 as being anticipated by U.S. Pat. No. 4,511,229 to Schwartz et al. on page 3 of the Office Action while Claims 11-13 and 16 have been rejected under 35 U.S.C. §103 as obvious additionally in view of U.S. Pat. No. 4,977,521 to Kaplan on page 6 of the Office Action. However, it is respectfully submitted the invention as recited in all pending claims herein is patentable over the applied art, for the following reasons.

The present invention is directed to evaluating spectral response of recording medium at the same time a picture is taken, as well as response of the recording medium to different intensity values at the same time the picture is taken. This is accomplishing by taking into account the special situation at the time the picture is taken, e.g., dependence of the

- (i) spectral sensitivity of the recording medium on the temperature;
- (ii) response of the recording medium to different intensity values on the temperature;
- (iii) spectral sensitivity of the recording medium on aging effects; and
- (iv) response of the recording medium to different intensity values on aging effects.

In contrast, it is the goal of Schwartz et al to sample the light source illuminating the scene. As illustrated, e.g., in Fig. 2 of this reference, the light source is separated into different colors which are then recorded on the film (col.5, lines 17-32). Thus, Schwartz et al. fail to anticipate the claimed invention.

Furthermore, it is the goal of Kaplan to reduce noise in photographic film which requires positive and negative images of the scene. This is accomplished, according to Kaplan, by providing a gray scale step tablet 110 which is recorded on a frame 36 reserved for use by a film development laboratory (Fig. 7 and col. 6, lines 9-11). Alternatively, this frame may be exposed during manufacture or by a special device within the camera described at col. 5, line 66 – col. 6, line 4. In any case, the calibrated light source 105 of Kaplan is recorded on the recording medium 100 clearly before or after the pictures are taken. Therefore, Kaplan adds nothing to Schwartz et al which renders the claimed invention obvious.

Contrary to the disclosure in Schwartz et al., the present invention uses one or more white light spots which may be created, for example, by a white light source without separation into a color-test-set. The white light spot is recorded at the same time the picture is taken without necessity of spectral and spatial separation. It is unnecessary to use filters to separate the white light, the present invention permitting relatively simple construction which may simply comprise a white light source.

It is possible to image a white light source onto the recording medium (e.g., using a lens) and/or use a fiber to guide the light to the recording medium and/or use a white light source with direct contact to the recording medium (the simplest solution). The white light may have continuous spectral emission (e.g., each wavelength to which the recording medium is sensitive is present in the emission spectrum of the white light, i.e., reference light source). If the spectrum is continuous, the white point recorded represents the complete color space if a spectral sensor (e.g., an integrated spectrum-analyzer) is

used (where the picture is reproduced), and the spectral response of the recording medium might be evaluated for each point of the color space.

Further, the white light spot might have a discrete spectral emission, e.g., red, green, blue combined to a white (reference) light source. This combination might be accomplished by one single LED or a lens focusing three LED's onto a single white point (or three fibers tapered to one).

Schwartz et al fail to disclose recording a white light spot on the recording medium and applying color-test points of identical colors but different intensity values. Kaplan fails to disclose recording one or more white light spots on the recording medium at the same time the picture is taken, and using only one light source or color-test points of identical colors but different intensity values.

The present invention permits, for example, using only one white light source and recording test points of different intensity values while the area of the taken picture is transported out of the image plane. It is further possible to use only one white light source and record a test "intensity stripe" while the area of the taken picture is transported out of the image plane (e.g., reduce intensity of the light source continuously during the area of the taken picture is transported out of the image plane).

It is further possible to use two (or more) white light sources with the same intensity value but different spectral characteristics to enable correction of color and intensity response. In this situation, it is a white light spot per definition but for some points in the color space there are different intensity values present. Therefore, it is possible to correct the response of the recording media to different intensity values for these points in the color space (one point might be sufficient). This provides good correction of the

intensity characteristic of the recording media. A set of three corrected points in the color space might be corrected in this fashion. These three points might be arranged in a manner such that the white point is centered between these three points.

The remaining art of record has not been applied against the claims and will not be commented upon further.

Accordingly, in view of the forgoing amendment and accompanying remarks, it is respectfully submitted all claims pending herein are in condition for allowance. Please contact the undersigned attorney should there be any questions. A petition for an automatic one month extension of time for response under 37 C.F.R. 1.136(a) is enclosed in triplicate together with the requisite petition fee plus the fee for the additional claims introduced herewith.

Early favorable action is earnestly solicited.

Respectfully submitted,



George M. Kaplan

Registration No.: 28,375

Attorney for Applicant(s)

DILWORTH & BARRESE, LLP
333 Earle Ovington Blvd.
Uniondale, New York 11553
(516)228-8484